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Exploring Parenting as a Predictor of Criminogenic Thinking Among College Students

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The University of Southern Mississippi

**EXPLORING PARENTING AS A PREDICTOR OF CRIMINOGENIC
THINKING AMONG COLLEGE STUDENTS**

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by Rose Angelino Gonzalez

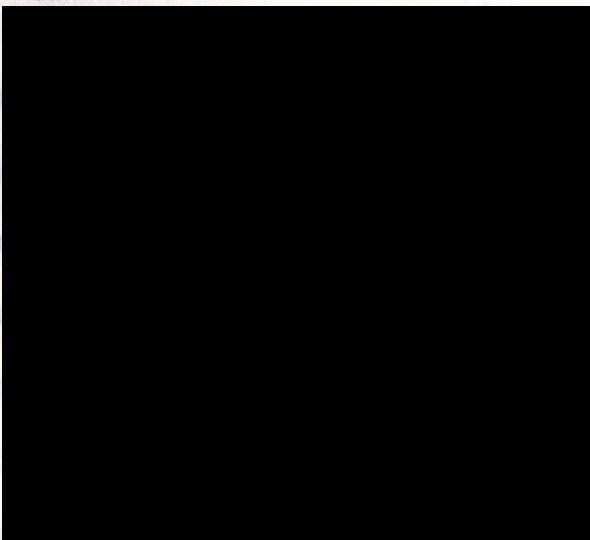
by

Rose Angelino Gonzalez

A Thesis

Submitted to the Graduate School
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in Partial Fulfillment of the Requirements
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ABSTRACT

EXPLORING PARENTING AS A PREDICTOR OF CRIMINOGENIC THINKING IN COLLEGE STUDENTS

by Rose Angeline Gonzalez

May 2012

Antisocial cognitions and attitudes, globally labeled as criminogenic thinking, are shown to perpetuate maladaptive and antisocial behavior in both criminals and non-offenders. In the non-offender population, these thinking patterns may not lead to illegal behavior, but can result in irresponsible or maladaptive behavioral consequences. Theories suggest that early childhood parent-child interactions may be partly responsible for the development of criminogenic thinking. While the relationship between parenting and antisocial behavior is well documented, the connection between parenting and the development of criminogenic thinking styles has not yet been explored. The current study examined the nature of the relationship between exposure to parenting behaviors and subsequent criminogenic thoughts in a non-offender, college population. It was hypothesized that unhealthy parenting approaches would be predictive of criminogenic thinking. Results indicate that parenting may impact general criminogenic thinking, as well as specific types of criminogenic thinking styles. Relevance and importance of the findings with regards to clinical work and parenting are also discussed.

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CHAPTER II

INTRODUCTION

Maladaptive behavior in college students is a problem, with research indicating that large numbers of college students engage in illegal activities such as intoxicated driving, drug use and interpersonal aggression (Fromme, Katz, & Rivet, 2007; Zimny, Robertson & Bortoszek, 2008). Beyond the prevalence of illegal behavior, other maladaptive behaviors are also problematic in college student populations, such as academic and personal dishonesty (Zimny et al., 2008) and risky sexual behavior (Fromme et al., 2007).

Much research has been done to attempt to understand possible causes of antisocial behavior in adolescents and young adults. For example, research studies have indicated links between temperament (e.g., Kingston & Prior, 1995), impulsivity (e.g., Loeber, 1990), cognitive biases (Liau, Barriga, & Gibbs, 1998), cognitive attribution errors (Dodge, 1991), and familial variables (Dembo, Turner, & Jainchill, 2007) to antisocial behavioral outcomes in young adults. Liau et al. (1998) examined self-serving cognitive distortions in relation to adolescent misconduct and found that a strong link exists between these cognitions and antisocial behavior. Also, social information processing theory has been used to conceptualize antisocial behavior, with researchers finding that cognitive biases (i.e., self-centeredness, blaming others) propagate antisocial behavior (Liau et al., 1998). Although research has connected self-serving cognitive errors with antisocial behavior, little research has examined cognition in the framework of criminogenic thinking theories for the college population.

Criminogenic thinking is defined as those thinking styles or belief systems that precede criminal behavior (Walters, 1990). According to Walters (2006), the objective for studying these thinking styles is to understand how criminogenic thinking predicts maladaptive behavior and if an alteration in dysfunctional thoughts results in a change in that behavior. Although maladaptive thinking is a concern among college students due to its established connection to maladaptive behavior (Walters, 1990), most research pertaining to criminogenic thoughts is founded in the research of Yochelson and Samenow (1976), which focused on the prison population. Yochelson and Samenow (1976) postulated that a change in maladaptive thinking must occur before an alteration in behavior can occur. They identified 52 distinctive thinking errors, which they believed constituted the criminal personality. Yochelson and Samenow's study of criminogenic thinking has remained the theoretical underpinning of modern conceptualizations of criminogenic thinking.

Walters also made a substantial contribution with his hypothesis that criminogenic thinking patterns can develop into the criminal lifestyle. The criminal lifestyle is defined as the development and crystallization of criminogenic beliefs, which form a cognitive system that is focused on increasing maladaptive thinking during adolescence. This cognitive system subsequently influences behavior during the course of one's life (Walters, 1990). Through the re-interpretation and condensing of Yochelson and Samenow's 52 thinking styles, Walters identified eight thinking styles that comprise the criminal lifestyle. They include Mollification (blaming external factors for acts), Cutoff (mental elimination of crime deterrents), Entitlement (idea of deserving ownership), Power Orientation (desire to seek control on the external environment), Sentimentality

(negating negative behavior by expounding on other good acts), Superoptimism (overly positive attitude about avoiding crime consequences), Cognitive Indolence (thinking lazily, using cognitive short cuts), and Discontinuity (inability to follow through on one's goals) (Walters, 1990).

Walters proposed that belief systems underlie the development of criminogenic thinking. Belief systems are global patterns of thinking which form the most general cognitive system and aid in an individual's ability to evaluate and interpret life experiences. Walters' (2006) theory of global belief systems indicates that belief systems impact specific patterns of cognitions for both offender and non-offender populations. Therefore, one's faulty general belief system can result in high levels of specific criminogenic thinking styles. Lower levels of criminogenic thinking can be present in non-offender populations when belief systems are faulty or maladaptive, which may not necessarily result in criminal behavior but may result in generally irresponsible behavior (Walters, 2006).

Patterns of criminogenic thinking, however, may differ based on a person's status, according to research, which has shown demographic differences in these criminogenic patterns. Specifically, criminogenic thinking has been found to be higher among women and younger adults than men and older adults, respectively (Morgan, Bauer, Fisher, Mandracchia & Murray, 2008; Walters, 2002). Also, findings from Dembo, Turner, and Jainchill (2009) and Walters (2002) have evidenced that significant differences in criminogenic thinking exist across ethnicities. For example, some studies have shown that African Americans and Latinos report higher levels of criminogenic thinking than Caucasians (Walters & Geyer, 2004). Because these demographic characteristics are

often found to correlate with criminogenic thinking, they have been commonly used as control variables in previous studies (Butler, Fearon, Atkinson, & Parker, 2007).

Most studies of criminogenic thinking have focused on offender populations. Walters, however, posited that although criminogenic thinking is found in all criminals, it can be observed in non-offenders as well. Non-offenders may experience criminogenic thinking occasionally or consistently, and at generally lower levels than offenders. Walters differentiates non-offenders from offenders; even though non-offenders experience varying levels of criminogenic thinking, they have not "erected a lifestyle around these characteristics" (Walters, 1990, p. 130). While Walters stated that the major difference between non-offender criminogenic thinking and offender criminogenic thinking is a matter of severity, less severe cognitive patterns can be problematic when manifested in non-offenders because they still can lead to behavior that is unhealthy, problematic, and maladaptive (Walters, 1990). Therefore, criminogenic thinking varies in severity, from general maladaptive thinking to thinking that propagates and reinforces serious criminal behavior.

There is little research on criminogenic thinking in non-offenders, even though both theory and research findings indicate that it is prevalent in this population. In 2007, Walters studied this construct in college students in order to examine the extent of criminogenic thinking found in a non-offender population and to validate his measure (i.e., the Psychological Inventory of Criminal Thinking- Layperson [PICTS-L]) for non-offenders. Walters postulated two reasons why criminogenic thinking is important to explore in the non-offender population. First, the study helps researchers to understand and identify groups at high risk for engaging in criminal behavior. For example, McCoy

et al. (2006) found that criminogenic thinking predicts aggression and property crimes among college students. Second, in understanding criminogenic thinking in non-offenders more fully, preventive measures can be taken with the hopes of reducing the occurrence of criminal behavior (Walters, 2007). Further, other researchers have implicated criminogenic thinking in other issues besides criminal behavior, including mental health treatment engagement (e.g., low levels of treatment retention and motivation [Hughes, 2009]), antisocial acts (e.g., adolescent bullying, aggression; Ragatz, Anderson, Fremouq, & Schwartz, 2001), and general irresponsible thinking (Ragatz et al., 2001). Therefore, in addition to the prediction and prevention of crime, examining criminogenic thinking in non-offenders is important in order to gain insight related to the more common maladaptive behavior.

In examining variables related to criminogenic thinking some researchers have postulated that circumstantial variables, such as family relationships, are related to criminogenic thinking and maladaptive conduct. Previous research indicates that parenting, as conceptualized along the dimensions of care and protection, is related to antisocial attitudes and behaviors as well as internalizing problems (Gendreau, 1992; Hoeve et al., 2009). For example, Gendreau (1992) suggested that low levels of parental warmth and poor parental supervision are risk factors for antisocial behavior. Although researchers have implicated the importance of experiences in childhood on later antisocial behavior, there has been little exploration connecting criminogenic thinking, specifically, with parenting variables.

In examining parenting, two dominant theoretical frameworks emerge in the literature (Hoeve et al., 2009). One theoretical framework conceptualizes parenting as

typologies (i.e., Authoritative, Authoritarian, Permissive, Neglectful; Baumrind, 1971). The typologies viewpoint asserts that each dimension (i.e., care and protection) should not be separately examined. The other theoretical framework involves examining the quality of parenting using a dimensional approach to parenting behaviors (i.e., Care and Protection; Maccoby and Martin, 1983). This approach conceptualizes parenting behaviors as two separate constructs on a continuum of intensity. The care dimension examines the extent of parental warmth. At the highest end of the continuum, this variable is described as empathy, warmth, closeness and caring, and at the lowest end of the continuum, is described as coldness and neglectfulness. Protection, the degree of psychological and behavior control a parent has, is characterized at the highest end as intrusiveness and overprotection, and at the lowest end of the continuum as respectful of autonomy and growth-promoting (Hoeve et al., 2009; Parker, Tupling, & Brown, 1979).

Low levels of the care dimension of parenting are characterized as a rejecting approach to parenting and are related to delinquency. Conversely, high levels of care, indicative of a supportive approach to parenting, are inversely related to delinquency (Barnes & Farrell, 1992). Low levels of care and high levels of protection have shown to be associated with adolescent drinking, illicit drug use, and academic misconduct (Barnes et al., 1992). Literature has also drawn a connection between the protection dimension of parenting and negative outcomes. For example, high levels of protection, which often involves psychological and behavioral control as well as punitive treatment, are related to aggressive dispositions in children and antisociality in young adults (Schaffer, Clark, & Jeglic, 2009; Zhou, Eisenberg, Wang, & Reiser, 2004). Further, high levels of behavioral control (i.e., rule setting, monitoring) has been found to be more strongly related to

externalizing problems in adolescents, while psychological control (i.e., use of guilt, manipulation) has been linked to internalizing problems. Conversely, extremely low levels of behavioral control, also called protection, are characterized as permissive and disengaged (Barber et al., 1994).

Research has also been done to examine the impact of specific parenting behaviors on childhood antisocial behavior. For example, Bowman et al. (2007) examined maternal monitoring and involvement, and found that these behaviors increase healthy psychosocial outcomes and decrease involvement in deviant peer groups among adolescents. Also, poor parental supervision and deficient caretaking is predictive of adolescent misconduct (Knutson et al., 2004). A meta-analysis conducted by Hoeve et al. (2009) found that parental monitoring, psychological control, and negative support account for approximately 11% of the variance in adolescent criminal behavior. Overall, a substantial amount of research has been done on discrete parenting behaviors and delinquent *behavioral* outcomes. However, the literature is inconsistent about the extent of the effect of parenting dimensions of care and protection on antisocial outcomes, with previous research providing various effect sizes (Hoeve et al., 2009).

While there is a large body of literature connecting poor parenting behaviors and antisocial *behavior*, few studies have focused on connecting parenting to criminogenic thinking. Cuadra (2007) found that criminogenic thinking acts as a mediator in the relationship between childhood abuse and criminal behavior. The study indicated that the type of child maltreatment (i.e. physical, emotional abuse, neglect) is related to specific types of criminogenic thinking styles in adult male offenders. Cuadra (2007) found that physical and emotional abuse and neglect in one's childhood are positively correlated

with Entitlement, Mollification, and Cutoff criminogenic thinking styles among offenders. These findings highlight the importance of the type of criminogenic thinking as it relates to childhood treatment. Also, Dembo, Turner and Jainchill (2007) found a strong positive correlation between poor family functioning, involving generally poor family cohesion and conflict, and overall criminogenic thinking.

Although research has connected parenting to antisocial behavior outcomes, no research has been done to make a definitive connection between the parenting dimensions of care and protection and criminogenic thinking (Hoeve et al., 2009). Cuadra's finding that Cutoff, Mollification, and Entitlement were significantly related to childhood maltreatment is partially consistent with Walter's (2002) theory, which reasons that Entitlement and Mollification criminogenic thinking styles may develop in part due to parental involvement in early childhood. According to Walters' theory, Mollification involves self-justification and rationalizations based on the inequities of personal life circumstances or the larger society. This criminogenic thinking style justifies one's actions because of personal circumstances and perceived unfairness of the world, which originates in the immaturity of adolescence. Walters proposed that Entitlement involves the belief that societal rules do not apply because of personal privilege, and is common when parents send the message of unsurpassed worth, uniqueness, and entitlement. Therefore, those who engage in Entitlement criminogenic thinking often consider themselves as above societal rules and often misidentify wants as needs (Walters, 1990).

Based on the previous research that has connected childhood abuse to Mollification, Cutoff, and Entitlement (Cuadra, 2007), and Walter's (2002) theoretical grounding of Mollification and Entitlement, the current study will attempt to determine

the relationship between specific criminogenic thinking styles (i.e. Mollification, Cutoff, and Entitlement) and experienced parenting approaches. In regards to conceptualization of parenting (i.e., typology-based versus dimensional), a dimension approach will be used for the current study, as the goal is to assess the impact of each dimension separately on criminogenic thinking.

Purpose of the Study

In light of the gaps in the literature examining how parenting dimensions (i.e. care and protection) relate to criminogenic thinking, along with the importance of understanding criminogenic thinking in non-offenders (Andrews et al., 1990; Dembo et al., 2007; Mandracchia & Morgan, 2010), further exploration of these relationships is warranted. Although research has been done to determine the relationship between parenting behaviors and subsequent criminal behavior (Bowman et al., 2007; Hoeve et al., 2009), researchers indicate that the relationship between parenting approaches and criminogenic thinking is still unclear (Dembo et al., 2007), highlighting the need for investigation. Previous research has consistently indicated adolescent behavioral outcomes related to parenting behaviors (Borstein, 2002; Hoeve et al., 2009; Pelcovitz et al., 2000; Steinberg et al., 2001; Zhou et al., 2004). Also, research has identified specific criminogenic thinking styles (i.e. Mollification, Cutoff, and Entitlement) that are associated with childhood maltreatment (Cuadra, 2007). No research has been done to determine if parenting dimensions relate to overall criminogenic thinking or specific criminogenic thinking styles. Therefore, the purpose of this study is to determine the relationship between parenting dimensions (i.e. care and protection) and criminogenic thinking in a sample of non-offenders.

Research Questions

In light of the lack of current literature regarding parenting styles and criminogenic thinking, two primary questions were evaluated in the proposed study:

- 1) Do care and protection parenting variables predict overall criminogenic thinking?
- 2) Do care and protection parenting variables predict criminogenic thinking styles of cutoff, entitlement, and mollification?

CHAPTER II

METHODOLOGY

Participants

Participants were obtained using a convenience sampling approach. Survey instruments were posted online and 155 participants completed the entire survey. Exclusion criteria used to determine the final sample included the three validity scales of the PICTS-L, which are the Cannot Say, Confusion, and Defensiveness scales. The Cannot Say validity scale cutoff is more than five responses left blank. In this sample, 3.8% (n=6) left more than five items blank on the PICTS and were removed from the final sample. The Confusion validity scale uses a T score of 81 as a cutoff for exclusion. Of the respondents in this sample, 1.3% (n=2) violated this cutoff score and were removed from the final sample. Similarly, the Defensiveness validity scale cutoff score is 65T, and 18.1% (n=28) of the sample exceeded this cutoff score and were removed.

The final sample included 119 participants. Some demographic characteristics are presented in Table 1. All other demographic data and reported behaviors not included in the analyses can be found in Appendix A. The sample was predominately female (83.2%) and White (46.5%). Further, the majority of the sample indicated their mothers as primary caregivers (81.5%). With regards to maladaptive behavior, the most prevalent behaviors reported are as follows: 21% (n=25) of the sample reported cheating on a test, 9% (n=11) reported shoplifting, 54% (n=46) reported drinking alcohol as a minor, 30% (n=35) reported drinking and driving, and 19% (n=22) reported having unprotected, or unsafe, sex.

Table 1

Demographic Characteristics of the Sample

Characteristic	N	%
Gender		
Male	20	16.8
Female	99	83.2
Year in School (current)		
Freshman	47	39.5
Sophomore	28	23.5
Junior	19	16.0
Senior	24	20.2
Primary Caregiver		
Mother	97	81.5
Father	8	6.7
Grandmother	6	5.0
Aunt	4	3.4
Other	4	3.4
Ethnicity		
White	72	46.5%
Black	71	45.8%
Other	12	7.7%

Measures*Demographic Questionnaire*

Participants completed a general demographic questionnaire created by the researcher for the purposes of the study. Items included questions concerning gender, age, ethnicity, and criminal behavior history (See Appendix C).

Parental behavior

Parental behavior was assessed using the Parental Bonding Instrument (PBI), a retrospective self-report measure developed by Parker et al. (1979) to measure recollected parenting behaviors and parenting styles of respondents 16 years old and above. Answers on this 25-item measure were reported on a four point Likert scale from *very like* (0) to *not very like* (3), and the instrument has a range of 0-74. The instrument measures two variables: overprotection and care. The high end of the dimension of "care" is characterized as affection and emotional warmth, while the low end of the dimension of "care" is described as cold, neglectful, and apathetic (Pelcovitz et al., 2000). The dimension of protection at the high end is characterized as over controlling and intrusive, while the low end of the variable is described as the allowance for autonomy (Pelcovitz et al., 2000; see Appendix D). Care and Protection subscale scores will be used in the current study.

Evidence of reliability and validity has been presented for the PBI (Parker et al., 1979). The researchers reported high test-retest reliability coefficients ($r = .79-.85$) for both subscales after a three-month period among college students (Parker et al., 1989). Split-half reliability coefficients were also found in a non-clinical sample ($r = .88$ and $.74$; Parker et al., 1987). For the current study, internal consistency coefficients indicate measurement reliability in an acceptable range (Care subscale; $r = .93$, Overprotection subscale; $r = .81$). Research indicates that the PBI is a valid assessment of parenting even though the caregiver does not complete the instrument (Parker, 1981). Evidence of divergent and convergent validity has also been found using retrospective parenting measures (Gerslma, Arrindell, van der Veen, & Emmelkamp, 1991). There is also

evidence for predictive validity, as the measure predicts direction of scores on measures of depression, relationship wellbeing, and life satisfaction (Gerslma et al., 1991).

Criminogenic thinking

Criminogenic thinking was assessed with the Psychological Inventory of Criminal Thinking Styles - Layperson Edition (PICTS-L; Walters, 1995). The 80-item PICTS-L is a self-report questionnaire designed to determine the presence of criminogenic thinking styles among non-offenders. It is derived from the original PICTS measure, in which the wording and content of some items were modified in order to make the item content more applicable to non-offenders. These criminogenic thinking style subscales include Mollification, Cut-off, Entitlement, Power Orientation, Sentimentality, Superoptimism, Cognitive Indolence, and Discontinuity.

The PICTS also includes two content scales (Current and Historical), three validity scales (i.e. Cannot Say, Confusion, Defensiveness), two composite criminogenic thinking scales (i.e. Proactive and Reactive), and four factor scales (i.e. Problem Avoidance, Infrequency, Self-Assertion, Denial of Harm). Also, a General Criminal Thinking scale (GCT) measures overall criminogenic thinking. Answers are reported on a four-point Likert scale, ranging from *disagree* (1) to *strongly agree* (4). For the purpose of this study, three criminogenic thinking style subscales (i.e., Mollification, Cutoff, and Entitlement) were used as well as the criminogenic thinking total scale (i.e., General Criminal Thinking). Three validity scales were used as exclusion criterion to ensure participants with invalid response styles (randomly responding, leaving questionnaires incomplete, or underreporting criminogenic thinking) were not included in the study.

Evidence of internal consistency, test-retest reliability, and preliminary validity for the PICTS-L has been found to be comparable to the original PICTS (Walters, 2002), however, specific findings related to evidence of reliability and validity are not explicitly stated in the literature. Walters (2002) indicated test-retest reliability of the PICTS that ranges from .73 (Sentimentality) to .85 (Discontinuity) using a two-week test interval. Internal consistency for the eight thinking styles was found to range from .55 to .79. Strongest evidence of internal consistency is found in the General Criminal Thinking score, which is .93. Extensive evidence of concurrent, predictive, and construct validity have also been reported (Walters, 2002). Walters found predictive validity of the measure for recidivism and mental health treatment program dropout, with significant mean effect sizes for all eight subscales ranging from .12 to .20. Concurrent validity was also found with criminal history indicators (e.g., prior arrests). Mean effect sizes were found to range from .13 to .23 for the subscales being currently used (Walters, 2002). For the current study, internal consistency for the General Criminal Thinking scale ($r = .95$) was found to be strong, and internal consistency for the subscales used ranged from .54-.78 (Walters, 2002, see Appendix E).

Procedure

After The University of Southern Mississippi's Institutional Review Board approved this research study, participants were recruited using the Department of Psychology's online research system, Sona Systems, Ltd. (<http://usm.sona-systems.com/>). Participants completed the consent form (See Appendix B) and all instruments (See Appendix D and E) on PsychSurveys (<http://www.psychsurveys.org/>). The brief demographic questionnaire was presented first, followed by the PBI and the

PICTS-L. The two study instruments were presented in random order to control for order effects. The participants indicated who their primary caregiver was and completed the Parental Bond Instrument for that caregiver.

Research Questions and Hypotheses

1. Do care and protection parenting dimensions predict overall criminogenic thinking?

H 1. When controlling for gender and ethnicity, care and protection will predict general criminogenic thinking as measured by the PICTS-L GCT scale.

2. Do care and protection parenting dimensions predict specific types of criminogenic thinking styles?

2.A. Do care and protection parenting dimensions predict Cutoff?

H 2.A. When controlling for gender and ethnicity, Cutoff subscale scores on the PICTS-L will be predicted by care and protection scores on the PBI.

2.B. Do care and protection parenting dimensions predict Entitlement?

H 2.B. When controlling for gender and ethnicity, Entitlement subscale scores on the PICTS-L will be predicted by care and protection scores on the PBI.

2.C. Do care and protection parenting dimensions predict Mollification?

H 2.C. When controlling for age, gender, and ethnicity, Mollification scores on the PICTS-L will be predicted by care and protection scores on the PBI.

CHAPTER III

RESULTS

Means, standard deviations, and correlation coefficients for the instruments used are presented in Table 2. Overall, scores on the PICTS-L were within a standard deviation of those means reported in college samples (Walters, Felix & Reinoehl, 2009). For the current sample, the average Care parenting subscale scores were within the normal range of scores reported in other studies; however, Protection parenting scores were slightly higher than those reported in studies using the measure (Pelcovitz et al., 2000), indicating that the current sample may have experienced a more protective and controlling parenting approach. The measures demonstrated good internal consistency (See Table 3).

Table 2

Means, Standard Deviations, and Correlation Coefficients for Measures

	1	2	3	4	5	6
1. PBI-Care	1	-.548**	-.373**	-.365**	-.292**	-.305**
2. PBI-Overprotection		1	.34**	.252**	.213*	.296**
3. PICTS-L GCT			1	.87**	.817**	.842**
4. PICTS-L Co				1	-.623**	.69**
5. PICTS-L En					1	.729**
6. PICTS-L Mo						1

Table 2 (continued).

	1	2	3	4	5	6
<i>Mean</i>	33.28	21.75	120.94	15.27	14.01	13.73
<i>SD</i>	8.33	6.73	28.96	4.79	4.69	4.39

Note: PBI Care = Parental Bonding Inventory Care Subscale; PBI Overprotection = Parental Bonding Inventory Overprotection Subscale; PICTS-L GCT = Psychological Inventory of Criminal Thinking-Layperson General Criminal Thinking; PICTS-L Co = Psychological Inventory of Criminal Thinking-Layperson Cutoff Subscale; PICTS-L En = Psychological Inventory of Criminal Thinking-Layperson Entitlement Subscale; PICTS-L Mo = Psychological Inventory of Criminal Thinking-Layperson Mollification Subscale; * $p < .05$, ** $p < .01$

Table 3

Chronbach's Alpha Coefficients of Measures Used

Variable	<i>R</i>
1. PBI Care	.93
2. PBI Protection	.81
3. PICTS-L General Criminal Thinking	.95
4. PICTS-L Cutoff	.77
5. PICTS-L Mollification	.76
6. PICTS-L Entitlement	.81

To determine whether the assumptions of regression were met, a series of visual and statistical analyses were performed. For each linear regression model, matrix scatterplots and simple scatterplots were used to examine whether linearity and

homoscedasticity assumptions were met. To determine whether the homoscedasticity assumption was met, unstandardized predicted and residual values were plotted. To detect whether the linearity assumption was met, a matrix scatter plot of unstandardized predicted and residual values was plotted. Visual examination of the graphs indicated that homoscedasticity and linearity assumptions were likely not violated. Collinearity statistics for each analysis were within the acceptable range. Histograms were used to determine whether the normality of residuals assumption was violated. Visual examination of the histogram graphs indicates that this assumption was not violated for Hypothesis 1. However, the histogram graphs show some non-normality for the second, third, and fourth hypotheses tested. Limitations related to this violation of normality regression assumption are discussed later. Overall, with the exception of normality, it appears that the assumptions were met.

With regards to the level of criminogenic thinking, this sample of college students reported meaningful levels of dysfunctional thinking ($m = 120.94$; see Table 2). For the current sample, General Criminal Thinking scores averaged at 50 T , which is compared to prison population norms, in which a T score above 60 indicates a significantly elevated criminogenic thinking level (Walters, 2010). Therefore, it is likely that college students do, in fact, engage in dysfunctional thinking, which may contribute to irresponsible or illegal behavior (i.e., drunk driving, drinking underage, academic dishonesty) (Fromme et al., 2008; Zimny et al., 2007).

Four hierarchical linear regression (HLR) analyses were conducted to evaluate the ability of parenting variables to predict levels of criminogenic thinking. One analysis was conducted for each of the three PICTS-L subscales of interest (i.e., Cutoff, Entitlement,

Mollification), and for the total PICTS-L score (i.e., PICTS-L GCT). In each analysis, demographic variables (i.e., ethnicity and gender) were entered into the first block because of their impact on criminal thinking found in previous studies (Butler et al., 2007). Gender was dichotomized (i.e., male=1, female=0) for the analyses. Ethnicity was dummy-coded such that Black and Other were each contrasted with White (i.e., White=0, Black=1, other=2). In the second block, parenting variables of Care and Protection were entered as continuous variables. In all analyses, the dependent variable was one of the four criminogenic thinking variables.

Hypothesis 1

For the first hypothesis, which stated that Care and Overprotection will predict General Criminal Thinking (GCT) scores, a hierarchical linear regression analysis was used to predict the PICTS-L GCT score. Care and Overprotection accounted for 16.8% of the variance in PICTS-L GCT scores, which was significant ($R^2 = .168$, $F(5, 111) = 4.490$, $p = .001$; See Table 4). Individually, Care predicted PICTS-L GCT scores ($p = .013$), while Overprotection did not ($p = .060$). Therefore, the hypothesis was partially supported.

Table 4

Hierarchical Linear Regression Analysis Predicting PICTS-L GCT Scores From Demographic Variables and PBI Score Variables

Predictor Variable	<i>B</i>	SE <i>B</i>	β	R^2	ΔR^2
<u>Step 1:</u>				.003	.003

Table 4 (continued).

Gender, Male=1	2.814	7.635	.037		
Black Ethnicity	2.627	5.711	.045		
Other Ethnicity	3.747	12.094	.031		
<u>Step 2:</u>				.168	.165**
PBI Care	-.916	.362	-.263*		
PBI Overprotection	.865	.455	.200		

Note: * $p < .05$; ** $p < .01$

Hypothesis 2.A

For the second hypothesis, which stated that Cutoff (Co) scores on the PICTS-L will be predicted by Care and Overprotection scores on the PBI, a hierarchical linear regression model was used to predict PICTS-L Cutoff scores. Care and Overprotection accounted for 10% of the variance in PICTS-L Cutoff scores, which was significant ($R^2 = .139$, $F(5, 111) = 3.584$, $p = .005$; See Table 5). Individually, Care subscale scores predicted PICTS-L Cutoff scores ($p = .002$), while Overprotection subscale scores did not ($p = .535$). See Table 5.

Table 5

Hierarchical Linear Regression Analysis Predicting PICTS-L Cutoff from

Demographic variables and PBI Score Variables

Predictor Variable	<i>B</i>	SE <i>B</i>	β	R^2	ΔR^2
<u>Step 1:</u>				.003	.003

Table 5 (continued).

Gender, Male=1	-.668	1.249	-.053		
Black Ethnicity	.108	.934	.011		
Other Ethnicity	.758	1.979	.038		
<u>Step 2:</u>				.139	.136*
PBI Care	-.187	.060	-.328*		
PBI Overprotection	.047	.076	.067		

Note: * $p < .01$

Hypothesis 2.B

For this hypothesis, which stated that Entitlement (En) scores on the PICTS-L will be predicted by Care and Overprotection scores on the PBI, a hierarchical linear regression model was used to predict PICTS-L En scores. Care and Overprotection accounted for 10.3% of the variance in PICTS-L En scores, which was significant ($R^2 = .103$, $F(5, 111) = 2.556$, $p = .031$; See Table 6). Individually, Care predicted PICTS-L En scores ($p = .023$), while Overprotection did not ($p = .467$).

Table 6

Hierarchical Linear Regression Analysis Predicting PICTS-L Entitlement from Demographic Variables and PBI Score Variables

Predictor Variable	<i>B</i>	SE <i>B</i>	•	R^2	ΔR^2
<u>Step 1:</u>				.014	.014
Gender, Male=1	1.067	1.228	.086		

Table 6 (continued).

Black Ethnicity	.210	.919	.022		
Other Ethnicity	1.392	1.945	.071		
<u>Step 2:</u>				.103	.089*
PBI Care	-.140	.061	-.248*		
PBI Overprotection	.056	.076	.080		

Note: * $p < .05$

Hypothesis 2.C

This hypothesis stated that Mollification (Mo) scores on the PICTS-L will be predicted by Care and Overprotection scores on the PBI. To test this hypothesis, a hierarchical linear regression model was used. Care and Overprotection subscale score predictors accounted for 16.1% of the variance in PICTS-L Mo scores, which was significant ($R^2 = .161$, $F(5, 111) = 4.245$, $p < .001$). Individually, Care subscale scores was not predictive ($p = .077$), while Overprotection subscale scores significantly predicted PICTS-L Mo scores ($p = .034$, See Table 7).

Table 7

Hierarchical Linear Regression Analysis Predicting PICTS-L Mollification from Demographic variables and PBI score variables

Predictor Variable	<i>B</i>	<i>SE B</i>	β	R^2	ΔR^2
<u>Step 1:</u>				.004	.004
Gender, Male=1	1.888	1.148	.161		

Table 7 (continued).

Black Ethnicity	-.435	.858	-.049		
Other Ethnicity	-1.490	1.818	-.080		
<u>Step 2:</u>				.161	.157**
PBI Care	-.099	.055	-.186		
PBI Overprotection	.150	.070	.227*		

Note: *p < .05; **p < .01

CHAPTER IV

DISCUSSION

The purpose of the current study was to examine the relationship between parenting dimensions of care and overprotection and criminogenic thinking among college students. It was hypothesized that: (a) when controlling for gender and ethnicity, care and protection would predict overall levels of criminogenic thinking; and (b) when controlling for gender and ethnicity, care and protection would predict levels of Cutoff, Entitlement, and Mollification subtypes of criminogenic thinking, respectively.

Results indicated that each criminogenic thinking score was related to only one of the parenting variables, but never both. Therefore, all four hypotheses were only partially supported. Overall, criminogenic thinking, as well as Cutoff and Entitlement thinking styles, were related to the care dimension of parenting, meaning that experiencing high levels of warm and emotionally close parenting is related to lower levels of these criminogenic thinking scores. Lastly, the parenting dimension of Overprotection was significantly related to Mollification criminogenic thinking, meaning that as parenting becomes more restrictive and controlling, self-justification for maladaptive behavior increases.

Beyond finding a link between parenting and maladaptive thinking, the findings from the current study are important because they shed light on the relationship between specific dimensions of parenting and criminogenic thinking in young adulthood. Examining this relationship further highlights the impact of childhood experiences on adulthood adjustment. According to Walters (2010), Cutoff is often indicative of behavior that is impulsive or self-defeating (e.g., drug and alcohol abuse), as well as

uncontrollable emotions. Because of the inverse relationship between Care parenting and Cutoff, it is likely that parenting high in warmth may aid in the development of appropriate emotional expressions and healthy decision-making. In regards to Entitlement criminogenic thinking, this form of thinking involves a sense of ownership in violating societal constraints as well as a tendency to identify wants as needs. Because of the relationship between care-based parenting and subsequent Entitlement, it seems that warm parenting may buffer against this thinking style, perhaps by boosting social responsibility. Parenting that lacks emotional warmth may be a risk factor for later Cutoff and Entitlement thinking patterns and related problems.

Lastly, Mollification reflects neglecting personal responsibility for one's behavior. Because the results indicate that overprotective parenting is related to increases in Mollification, it seems that parenting that is highly controlling of a child may negatively impact the child's ability to develop an appropriate sense of responsibility. Therefore, less controlling, and autonomy-boosting, parenting approaches may aid in a child developing sense of personal responsibility for behavior. Overall, the relationships examined in the current study establish the nature of maladaptive thinking patterns which develop after childhood experiences of parenting.

Current findings seem to have support of previous literature stating that the three criminogenic thinking styles of Entitlement, Mollification, and Cutoff are related to parenting experiences (Cuadra, 2005). Although Cuadra's (2005) work focused on extreme parental mistreatment in relation to criminogenic thinking, current findings shed light on the phenomenon of possibly harmful dimensions of parenting (i.e., lack of empathic parenting, high levels of psychological and behavioral control) and subsequent

maladaptive thinking. It appears that more common but less severe detrimental aspects of parenting, and not just parental abuse, may be related to later maladaptive thinking. Also, the current results corroborate previous findings that lack of parental care is related to maladaptive outcomes (Barnes et al., 1992), and that overprotection is related to antisocial attitudes in young adulthood (Zhou et al., 2009).

This study helps establish a link between parenting and maladaptive thinking. Thus, the findings from this study may aid adolescent counselors or university counselors who treat clients with behavioral problems. Focusing treatment on altering criminogenic thinking styles and processing negative parent/child interactions may be beneficial for patients. Specifically, asking questions regarding Care and Protective facets of parenting may uncover risk factors for maladaptive thinking patterns. Further, a measure of criminogenic thinking seems to be a fruitful tool to uncover specific criminogenic thinking styles in order to inform treatment aimed at reducing these types of thinking (PICTS; Walters, 2010; MOTS-R; Mandracchia, Morgan, Garos & Garland, 2007). Overall, the findings not only highlight the connection between criminogenic thinking and parental behaviors but can also inform psychological treatment of maladaptive thinking and behavior.

Implications for College Students

Results from this study have implications for the population represented in the current sample. Extensive research concerning variables of maladaptivity in college students focuses on behavior (e.g., illicit drug use), and often fails to examine the related constructs of maladaptive thinking (Fromme et al., 2007; Zimny et al., 2008). Few previous studies have examined criminogenic thinking in college students (e.g., Walters,

2009). Therefore, the current study provides the levels of criminogenic thinking that a largely non-delinquent sample of college students engage in.

The current study supports Walters' (2009) previous finding that college students do, in fact, engage in moderate levels of criminogenic thinking. Theories of criminogenic thinking state that many maladaptive behaviors common among college students (e.g., illicit drug use, driving under the influence) are related to errors in thinking, and previous research has shown that criminal behavior can be largely explained in the context of this construct (Andrews, Bonta, & Hoge, 1990; Walters, 2000). Also, a sizeable portion of the present sample reported numerous unhealthy or irresponsible behaviors (i.e., underage alcohol consumption and drinking and driving), while some respondents reported cheating on examinations and having unprotected sex, respectively.

Because the current findings indicate that college students engage in criminogenic thinking as well as risky behaviors, using this information for college-based harm-reduction programming or intervention efforts (e.g., alcohol/drug use prevention, safe sex interventions) may prove beneficial. Knowing what types of thinking errors to target with college students at risk for engaging in maladaptive behaviors (i.e., alcohol/drug use, unsafe sex) may aid in helping professionals develop and implement these types of programs.

Implications for Parents

The current findings, which highlight the importance of parenting behaviors on college students' thinking, provide important implications for parents and caregivers. Findings indicate that high levels of care are related to lower levels of criminogenic

thinking. This type of parenting approach is considered a core component to secure parent-child attachments and is strongly tied to social competence and adjustment (Dekovic, Janssens, & Van As, 2003). Thus, parents are encouraged to increase their awareness about practices that facilitate a warm and nurturing home environment, in which a child's potential is facilitated through support, empathy, and warmth. Research shows that specific parenting practices coupled with positive parent-child relationships, in which parents provide a caring and warm environment, result in the most positive behavioral outcomes in adolescents. For example, parenting characterized by proactive strategies, instead of solely reactive parenting strategies, results in positive behavioral outcomes in their adolescents, such as a reduction in externalizing disorders (Padilla-Walker, Christensen, & Day, 2011). These types of parenting practices include reasoned deference (i.e., discussing problems with child, and then allowing the child to make their decision) and pre-arming (i.e., providing a plan for action before a potential difficulty) skills (Padilla-Walker et al., 2011). Further, parenting resources provide tips to engage in empathic and supportive parenting, such as listening to a child's concerns, spending time with the child engaging in his hobbies, and showing involvement in his interests (Center for Disease Control and Prevention, Child development).

The findings concerning parental protection can inform caregivers on healthy parenting behaviors to engage in regarding the issues of control and rule establishment. Previous literature has established that healthy control is characterized as consistent provision of appropriate rules and disciplinary boundaries (Dekovic et al., 2003). Parents are encouraged to avoid dysfunction responses to a child's misbehavior or violation of rules, characterized by anger and over-reactivity and stringent disciplinary styles.

Previous research has established that this type of stringent disciplinary style is contributory to internalizing problems (i.e., depressive symptoms) and externalizing problems (i.e., delinquency) (Barber et al., 1994). Further, healthy protective parenting involves the acknowledgement of a child's individuality and a commitment to the development and promotion of healthy autonomy (Barber, 1996). Parents are encouraged to respect an older child's need for privacy and include the child when determining expectations and rules in a collaborative way (Center for Disease Control and Prevention).

Limitations

Several limitations of the current study should be considered. The sample in the current study overwhelming identified as either Caucasian or Black. Further, the sample was largely female. Caution should be taken in generalizing results to college students of other minority statuses and to males. Also, the data was obtained using a convenience sampling approach, meaning that the sample may not be representative of the population of college students. Because the data violated the regression assumption of normality of residuals, the ability for the data to be applicable outside this sample is limited. Therefore, generalizability of the current findings to other populations should be done with caution.

Future Directions

The findings from the current study have implications for possible future studies. As mentioned previously, maladaptive behavior was not examined in the current study. Therefore, research should be done to determine which parenting dimensions and which criminogenic thinking styles are most related to subsequent maladaptive behavior in

college students. Examining whether behavioral manifestations occur as a result of criminogenic thinking is an important relationship to explore because having a greater understanding of this relationship can aid in prediction of maladaptive behaviors.

Also, a possibly fruitful avenue of research may involve examining parenting and maladaptive behavioral outcomes longitudinally. This research direction could result in a better understanding of the impact of previous parenting on young adults' thinking *and* behavior. Overall, a better understanding of this population's development of criminogenic thinking and related behavioral consequences (i.e., academic dishonesty, drinking under the influence, underage drinking, etc.) is needed in order to ameliorate and reduce those harmful behaviors most commonly engaged in by college students. Future directions may also be aimed at determining the utility and effectiveness of criminogenic thinking-focused treatment for college-aged maladaptive behavior, as well as psychoeducational programs for parents to improve parenting strategies and caretaking behaviors in order to positively impact their children's future behavior.

APPENDIX A

OTHER DEMOGRAPHIC CHARACTERISTICS AND REPORTED BEHAVIORS

Characteristics	N	%
Relationship Status		
Single	89	74.8
Partnered/Common Law	15	12.6
Divorced	5	4.2
Married	10	8.4
Spiritual/Religious Identification or Denomination		
Agnostic/Athiest	4	3.4
Catholic	14	11.8
Methodist	11	9.2
Baptist (i.e., Southern, Missionary, National Baptist Convention)	65	54.5
Presbyterian	1	.8
Church of God in Christ	8	6.7
Christian Episcopal	2	1.7
Unitarian-Universalist	1	.8
Other	13	10.9
Secondary caregiver		
Mother	12	10.1
Father	64	53.8
Grandparent	28	23.6
Aunt/Uncle	6	5.1
Other	7	5.9
Received counseling/therapy services		
Yes	33	27.7
No	86	72.3
Committed a crime past 6 months		
Yes	4	3.4
No	115	96.6
Arrested in past six months		
Yes	2	1.7
No	117	98.3
Been incarcerated for a crime		
Yes	3	2.5
No	116	97.5
Looked at someone's test during an examination		
Yes	25	21
No	94	79
Used someone else's answer on an examination		
Yes	21	17.6
No	98	82.4
Wrote down information secretly and used it during test		

Yes	19	16
No	100	84
Used someone else's paper and turned it in as yours		
Yes	2	1.7
No	117	98.3
Stopped attending school without an excuse for more than 10 days		
Yes	7	5.9
No	112	94.1
Took something from a store or a person without paying for it		
Yes	11	9.2
No	108	90.8
Been in a gang fight		
Yes	3	2.5
No	115	97.5
Consumed alcohol underage		
Yes	64	53.8
No	55	46.2
Driven a car while drunk, buzzed		
Yes	35	29.4
No	84	70.6
Used someone else's credit cards/checks without asking permission		
Yes	5	4.2
No	114	95.8
Unprotected sex with someone you weren't in a relationship with		
Yes	22	18.5
No	97	81.5
Followed someone when they didn't want you to		
Yes	9	7.6
No	110	92.4
Bought goods that may have been stolen		
Yes	8	6.7
No	111	93.3
Given someone marijuana in return for goods/money		
Yes	6	5
No	113	95
Used prescription drugs in any way other than those directed		
Yes	11	9.2
No	108	90.8
Hurt or tried to hurt someone on purpose		
Yes	16	13.4
No	103	86.6

Lied about age to buy cigarettes/alcohol		
Yes	18	15.3
No	100	84.7
Intentionally set fire to another's property		
Yes	2	1.7
No	117	98.3

APPENDIX B

INFORMED CONSENT FORM

The University of Southern Mississippi

Authorization to Participate in Research Project

Consent is hereby given to participate in the study entitled:

Retrospective Reported Parenting Styles as Predictors of Criminal Thinking

Purpose: This study is being conducted to investigate the relationship between experiencing poor parenting and a college student's criminal thinking.

1. Description of Study: Participants will be asked to complete questionnaires about the parenting behaviors of their caregivers and criminal thoughts. Participants will also be asked to complete a series of questionnaires online. This study should take approximately 45 minutes and will be worth one research credit.
2. Benefits: Although participants will receive no direct benefits by participating, the information provided will enable researchers to better understand the role of poor parenting in adulthood criminal thinking.
3. Risks: There are no foreseeable risks to participating in this proposed study. If you feel that completing these questionnaires have resulted in emotional distress, please stop and notify the lead researcher (Rose Gonzalez at Rose.Gonzalez@eagles.usm.edu). There is no penalty for withdrawing from this project at any time.
4. Confidentiality: These questionnaires are intended to be anonymous, and your name is requested on this page only for the purpose of assigning research credit. The information you provide will be kept strictly confidential, and your name will not be associated with your responses in any way.
5. Subject's Assurance: Whereas no assurance can be made concerning results that may be obtained (since results from investigational studies cannot be predicted), the researchers will take every precaution consistent with the best scientific practice. Participation in this project is completely voluntary, and you may withdraw from this study at any time without penalty or prejudice. Questions concerning this research should be directed to Rose Gonzalez (Rose.Gonzalez@eagles.usm.edu). This project and this consent form have been reviewed by the Human Subjects Review Committee, which ensures that research projects involving human subjects follow federal regulations. Any questions or concerns about rights as a research participant should be directed to the Chair of the Institutional Review Board, University of Southern Mississippi, 118 College Drive #5147, Hattiesburg, MS 39406-001.
6. Consent to Participate: I consent to participate in this study, and in agreeing to do so, I understand that:
 - a. I must be at least 18 years of age,

- b. I am being asked to complete a set of questionnaires which will take up to 1 hour and for which I will receive 1 research credit, and
- c. All information I provide will be used for research purposes and will be kept confidential.

I understand that my participation in this research is voluntary. If I decide to participate in the study, I may withdraw my consent and stop participating at any time without penalty or loss of benefits to which I am otherwise entitled.

I have read and understand the information stated, am at least 18 years of age, and I willingly sign this consent form. A copy can be printed by clicking on "file" at the top left and choosing "print" from the menu.

(Subject name printed)

(Subject signature)

Date

APPENDIX C
DEMOGRAPHIC FORM

Please check the response or fill in the blank where appropriate

1. What is your gender? (circle one) M F

2. Racial/Ethnic Identity

- a. _____ African American/Black
- b. _____ American Indian/Native American
- c. _____ Asian/Asian American
- d. _____ Biracial/Multiracial _____
- e. _____ Caucasian
- f. _____ Hispanic/Latino(a)
- g. _____ Other (Explain) _____

3. What is your relationship status? (check only one)

- a. _____ Single
- b. _____ Partnered/Common Law
- c. _____ Divorced
- d. _____ Separated
- e. _____ Married
- f. _____ Widowed

4. What year are you currently in here at the University of Southern Mississippi?

- a. _____ Freshman
- b. _____ Sophomore
- c. _____ Junior
- d. _____ Senior
- e. _____ Other (Explain):

5. What is your spiritual/religious identification or denomination (if any)?

6. Who raised you? (ex. mother and father, grandmother, mother only, father only)

7. Who do you consider your primary caregiver?

8. Who do you consider your secondary caretaker? (if anyone)

9. Have you ever received counseling/therapy services?

a. _____ Yes

b. _____ No

10. If yes, for what reason(s)?

11. Have you committed a crime in the past six months other than minor traffic violations? (ex. driving under the influence, drug use, theft)

a. _____ Yes

b. _____ No

12. If yes, what crimes have you committed?

13. Have you been arrested in the past six months?

a. _____ Yes

b. _____ No *If no, you have completed the questionnaire.*

14. If yes, for what? (list all offenses)

15. Have you ever been incarcerated for a crime?

a. _____ Yes.

b. _____ No. *If no, you have completed the questionnaire.*

16. Please list the type of crime(s) were you incarcerated for.

17. For how long were you incarcerated for the crimes listed above (in total)?

18. Please check the activities you have done in the past **six months**. Please remember that your answers are anonymous.

- ☐ Looked at someone's test during an examination?
- ☐ Used someone else's answer on an exam?
- ☐ Wrote down information secretly and used it during a test?
- ☐ Used someone else's paper and turned it in as yours?
- ☐ Stopped attending school without an excuse more than ten days?
- ☐ Took something from a store or a person without paying for it?
- ☐ Been in a gang fight?
- ☐ Consumed alcohol while under the age of 21?
- ☐ Driven a car while you were drunk, buzzed, or even a little tipsy?
- ☐ Used credit cards and/or checks that were not yours and without permission?
- ☐ Had unprotected sex with somebody you were not in a relationship with?
- ☐ Followed someone when they did not want you to?
- ☐ Bought or obtained goods that someone else might have stolen?
- ☐ Given someone marijuana in return for money/goods?
- ☐ Used prescription drugs in any way other than those directed by the instructions?
- ☐ Hurt or tried to hurt someone on purpose (besides just playing around)
- ☐ Stretched the truth about your age to buy cigarettes or alcohol?
- ☐ Intentionally set fire to destroy property that did not belong to you?
- ☐ Borrowed someone's car without permission?
- ☐ Forced someone to have sex with you?
- ☐ Used any illicit substance (marijuana, cocaine, LSD)
- ☐ Damaged property that was not yours?
- ☐ Attacked someone with a weapon with the intention of seriously hurting him/her?
- ☐ Provided illicit substances or prescription drugs in return for money/goods?
- ☐ Used any illicit substance (marijuana, cocaine, LSD) more than 20 times?

APPENDIX D

PARENTAL BONDING INSTRUMENT

This questionnaire lists various attitudes and behaviours of the parental figures. As you remember your PRIMARY CAREGIVER in your first 16 years place a tick in the most appropriate box next to each question.

	<i>Very like</i>	<i>Moderately Like</i>	<i>Moderately unlike</i>	<i>Very unlike</i>
1. Spoke to me in a warm and friendly voice				
2. Did not help me as much as I needed				
3. Let me do those things I liked doing				
4. Seemed emotionally cold to me				
5. Appeared to understand my problems and worries				
6. Was affectionate to me				
7. Liked me to make my own decisions				
8. Did not want me to grow up				
9. Tried to control everything I did				
10. Invaded my privacy				
11. Enjoyed talking things over with me				
12. Frequently smiled at me				
13. Tended to baby me				
14. Did not seem to understand what I needed or wanted				
15. Let me decide things for myself				
16. Made me feel I wasn't wanted				
17. Could make me feel better when I was upset				
18. Did not talk with me very much				
19. Tried to make me feel dependent on her/him				
20. Felt I could not look after myself unless she/he was around				
21. Gave me as much freedom as I wanted				
22. Let me go out as often as I wanted				
23. Was overprotective of me				
24. Did not praise me				
25. Let me dress in any way I pleased				

APPENDIX E

PSYCHOLOGICAL INVENTORY OF CRIMINAL THINKING STYLES –

LAYPERSON EDITION

(Version 4.0)

Glenn D. Walters, Ph.D.

Adapted by James C. Kaufman, Ph.D.

Directions: The following items, if answered honestly, are designed to help you better understand your thinking and behavior. Please take the time to complete each of the 80 items on this inventory using the four-point scale defined below:

4= strongly agree (SA)

3= agree (A)

2= uncertain (U)

1= disagree (D)

		<u>SA</u>	<u>A</u>	<u>U</u>	<u>D</u>
1	I will allow nothing to get in the way of me getting what I want...	4	3	2	1
2	I find myself blaming society and external circumstances for the problems I have had in life...	4	3	2	1
3	Change can be scary...	4	3	2	1
4	Even though I may start out with the best of intentions I have trouble remaining focused and staying 'on track'...	4	3	2	1
5	There is nothing I can't do if I try hard enough...	4	3	2	1
6	When pressured by life's problems I have said "the hell with it" and followed this up by doing whatever I want to do...	4	3	2	1
7	It's unsettling not knowing what the future holds	4	3	2	1
8	I find myself blaming people who are hurt when I behave badly by saying things like 'they deserved what they got' or 'they should have known better'...	4	3	2	1
9	One of the first things I consider in sizing up another person	4	3	2	1

		<u>SA</u>	<u>A</u>	<u>U</u>	<u>D</u>
	is whether he/she looks strong or weak...				
1 0	I occasionally think of things too horrible to talk about...	4	3	2	1
1 1	I am afraid of losing my mind...	4	3	2	1
1 2	The way I look at it, I've paid my dues in life just like anyone else, and am therefore justified in taking what I want ...	4	3	2	1
1 3	The more I get away with in life, the more I think there's no way I will ever be caught...	4	3	2	1
1 4	I believe that breaking the law is no big deal as long as you don't physically hurt someone...	4	3	2	1
1 5	I would not hesitate to get money in any way (legally or illegally) if my friends or family needed help...	4	3	2	1
1 6	I am uncritical of my thoughts and ideas to the point that I ignore the problems and difficulties associated with these plans until it is too late...	4	3	2	1
1 7	It is unfair that bank presidents, lawyers, and politicians get away with all sorts of illegal and unethical behavior every day and yet I could still be arrested for a much smaller crime...	4	3	2	1
1 8	I find myself arguing with others over relatively trivial matters...	4	3	2	1
1 9	I can honestly say that the I think of everyone's welfare before engaging in potentially risky behavior...	4	3	2	1
2 0	When frustrated I find myself saying 'screw it' and then engaging in some irresponsible or irrational act...	4	3	2	1
2 1	New challenges and situations make me nervous...	4	3	2	1
2 2	If I was ever caught committing a crime, there's no way I'd be convicted or sent to prison...	4	3	2	1
2 3	I find myself taking shortcuts, even if I know these shortcuts will interfere with my ability to achieve certain long-term	4	3	2	1

		<u>SA</u>	<u>A</u>	<u>U</u>	<u>D</u>
	goals...				
2 4	When not in control of a situation I feel weak and helpless and experience a desire to exert power over others...	4	3	2	1
2 5	Despite any bad things I may have done, deep down I am basically a good person...	4	3	2	1
2 6	I will frequently start an activity, project, or job but then never finish it...	4	3	2	1
2 7	I regularly hear voices and see visions, which others do not hear or see...	4	3	2	1
2 8	When it's all said and done, society owes me...	4	3	2	1
2 9	I have said to myself more than once that if I didn't have to worry about anyone "snitching" on me I would be able to do what I want without getting caught...	4	3	2	1
3 0	I tend to let things go which should probably be attended to, based on my belief that they will work themselves out...	4	3	2	1
3 1	I have used alcohol or drugs to eliminate fear or apprehension before doing something risky...	4	3	2	1
3 2	I have made mistakes in life...	4	3	2	1
3 3	I sometimes think that I would be willing to do anything, even something illegal, in order to live the life I have coming...	4	3	2	1
3 4	I like to be on center stage in my relationships and conversations with others, controlling things as much as possible...	4	3	2	1
3 5	When questioned about my motives for making poor choices, I have justified my behavior by pointing out how hard my life has been...	4	3	2	1
3 6	I have trouble following through on good initial intentions...	4	3	2	1

		<u>SA</u>	<u>A</u>	<u>U</u>	<u>D</u>
3 7	I find myself expressing tender feelings toward animals or little children in order to make myself feel better after engaging in irresponsible behavior...	4	3	2	1
3 8	There have been times in my life when I felt I was above the law	4	3	2	1
3 9	It seems that I have trouble concentrating on the simplest of tasks	4	3	2	1
4 0	I tend to act impulsively under stress	4	3	2	1
4 1	I should not be made to appear worthless in front of friends and family when it is so easy to take from others ...	4	3	2	1
4 2	I have often not tried something out of fear that I might fail...	4	3	2	1
4 3	I tend to put off until tomorrow what should have been done today...	4	3	2	1
4 4	Although I have always realized that I might get caught for doing something, I would tell myself that there was 'no way they would catch me this time'...	4	3	2	1
4 5	I could justify doing illegal activities such as selling drugs, burglarizing homes, or robbing banks by telling myself that if I didn't do it someone else would...	4	3	2	1
4 6	I find it difficult to commit myself to something I am not sure of because of fear...	4	3	2	1
4 7	People have difficulty understanding me because I tend to jump around from subject to subject when talking...	4	3	2	1
4 8	There is nothing more frightening than change...	4	3	2	1
4 9	Nobody tells me what to do and if they try, I will respond with intimidation, threats, or I might even get physically aggressive...	4	3	2	1

		<u>SA</u>	<u>A</u>	<u>U</u>	<u>D</u>
50	When I act irresponsibly, I will perform a 'good deed' or do something nice for someone as a way of making up for the harm I have caused...	4	3	2	1
51	I have difficulty critically evaluating my thoughts, ideas, and plans...	4	3	2	1
52	Nobody before or after can do it better than me because I am stronger, smarter, or slicker than most people are...	4	3	2	1
53	I have rationalized my irresponsible actions with such statements as 'everybody else is doing it so why shouldn't I'...	4	3	2	1
54	If challenged I will sometimes go along by saying, 'yeah, you're right,' even when I know the other person is wrong, because it's easier than arguing with them about it...	4	3	2	1
55	Fear of change has made it difficult for me to be successful in life...	4	3	2	1
56	The way I look at it, even if I've done bad things, it's okay, because I never intended to hurt anyone...	4	3	2	1
57	I still find myself saying, 'the heck with working a regular job, I'll just take it'...	4	3	2	1
58	I sometimes wish I could take back certain things I have said or done ...	4	3	2	1
59	Looking back over my life, I can see now that I lacked direction and consistency of purpose...	4	3	2	1
60	Strange odors, for which there is no explanation, come to me for no apparent reason...	4	3	2	1
61	I think that I can use drugs and avoid the negative consequences (such as addiction) that I have observed in others...	4	3	2	1
62	I tend to be rather easily sidetracked so that I rarely finish what I start...	4	3	2	1
63	If there is a short cut or easy way around something, I will find it...	4	3	2	1
64	I have trouble controlling my angry feelings...	4	3	2	1

		<u>SA</u>	<u>A</u>	<u>U</u>	<u>D</u>
4					
6 5	I believe that I am a special person and that my situation deserves special consideration...	4	3	2	1
6 6	There is nothing worse than being seen as weak or helpless...	4	3	2	1
6 7	I view the positive things I have done for others as making up for the negative things...	4	3	2	1
6 8	Even when I set goals I frequently do not obtain them because I am distracted by events going on around me...	4	3	2	1
6 9	There have been times when I tried to change but was prevented from doing so because of fear...	4	3	2	1
7 0	When frustrated I will throw rational thought to the wind with such statements as 'screw it' or 'the hell with it'...	4	3	2	1
7 1	I have told myself that with a better job, I would never have had to do irresponsible or questionable things...	4	3	2	1
7 2	I can see that my life would be more satisfying if I could learn to make better decisions...	4	3	2	1
7 3	There have been times when I have felt entitled to break the rules or behave poorly in order to pay for a vacation, new car, or expensive clothing that I told myself I needed ...	4	3	2	1
7 4	I rarely consider the consequences of my actions...	4	3	2	1
7 5	A significant portion of my life has been spent trying to control people and situations...	4	3	2	1
7 6	There are times when I have done bad things and not gotten caught, and sometimes I feel overconfident and feel like I could do just about anything and get away with it...	4	3	2	1
7 7	As I look back on it now, I was a pretty good person even if I've done irresponsible things...	4	3	2	1

		<u>SA</u>	<u>A</u>	<u>U</u>	<u>D</u>
7 8	There have been times when I have made plans to do something with my family and then cancelled these plans so that I could hang out with my friends, and behave irresponsibly...	4	3	2	1
7 9	I tend to push problems to the side rather than dealing with them...	4	3	2	1
8 0	I have used good behavior or various situations to give myself permission to do things that may be irresponsible or dangerous...	4	3	2	1

APPENDIX F

INSTITUTIONAL REVIEW BOARD FORM



THE UNIVERSITY OF SOUTHERN MISSISSIPPI

Institutional Review Board

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 Hattiesburg, MS 39406-0001
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**HUMAN SUBJECTS PROTECTION REVIEW COMMITTEE
 NOTICE OF COMMITTEE ACTION**

The project has been reviewed by The University of Southern Mississippi Human Subjects Protection Review Committee in accordance with Federal Drug Administration regulations (21 CFR 26, 111), Department of Health and Human Services (45 CFR Part 46), and university guidelines to ensure adherence to the following criteria:

- The risks to subjects are minimized.
 - The risks to subjects are reasonable in relation to the anticipated benefits.
 - The selection of subjects is equitable.
 - Informed consent is adequate and appropriately documented.
 - Where appropriate, the research plan makes adequate provisions for monitoring the data collected to ensure the safety of the subjects.
 - Where appropriate, there are adequate provisions to protect the privacy of subjects and to maintain the confidentiality of all data.
 - Appropriate additional safeguards have been included to protect vulnerable subjects.
 - Any unanticipated, serious, or continuing problems encountered regarding risks to subjects must be reported immediately, but not later than 10 days following the event. This should be reported to the IRB Office via the "Adverse Effect Report Form".
 - If approved, the maximum period of approval is limited to twelve months.
- Projects that exceed this period must submit an application for renewal or continuation.

PROTOCOL NUMBER: 11013102

PROJECT TITLE: **Retrospective Reports of Parenting Styles
 as Correlates to Criminogenic Thinking Styles**

PROPOSED PROJECT DATES: 01/01/2010 to 12/31/2011

PROJECT TYPE: **Dissertation**

PRINCIPAL INVESTIGATORS: **Rose Gonzalez**

COLLEGE/DIVISION: **College of Education & Psychology**

DEPARTMENT: **Psychology**

FUNDING AGENCY: **N/A**

HSPRC COMMITTEE ACTION: **Expedited Review Approval**

PERIOD OF APPROVAL: 02/08/2011 to 02/07/2012

Lawrence A. Hosman
 Lawrence A. Hosman, Ph.D.
 HSPRC Chair

2-9-2011
 Date

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